

CR100-A CR100-V SOLARIMETER

For QualiSOL, QualiPV certificated professionals and control office Guarantee Solar Result.

KEY POINTS

Dedicated to monitor the proper operating of plants using solar radiation :

- Hot water production
- Photovoltaic electricity production
- Applications in agronomy
- Meteorological monitoring...

Sends 0-10 V or 4-20 mA analogue signal proportional to the radiated solar power

via the interface connected to a PLC or a data acquisition system.

Allows monitoring of plants performance.

Removable, it can be periodically adjusted to guarantee measurement accuracy.

TECHNICAL FEATURES



Interface module

Output / Power supply	CR100-A : 4-20 mA passive loop sensor 18/30 Vdc power supply, 2 wires CR100-V : 0-10 V active sensor 10 % 24 Vac/Vdc, 3-4 wires
Peak load	500 Ohms (4-20 mA)
Minimum load	1 K Ohms (0-10 V)
Consumption	2 VA (0-10 V) or 22 mA (4-20 mA) max.
Electromagnetic compatibility	EN 61326
Electrical connection	Terminal block with screw for cables of 1,5 mm ² max
Operating temperature	from -20 to +50 °C
Housing	ABS
Fire class	H-B as per UL94
Housing overall dimensions	100 x 100 x 42 mm
Protection	IP 65
Wiring grommet	For cable of 7 mm max.
Weight	110 g



Solar cell

Measuring range

From 0 to 1300 W/m²

Spectral response

400-1100 nm

Nominal sensitivity

100 mv for 1000 W/m² STC (Standard Test Conditions 25 °C – Solar spectrum AM 1,5)

Response in cosine

Corrected until 80 °C

Coefficient in temperature

+0,1 %/°C

Effective area

1 cm²

Operating temperature

From -30 to +60 °C

Relative dependence

100 %RH

UV performance

Excellent (PPMA filter)

Mode

Photovoltaic

Material

Polycrystallin silicon

Front face

Translucent PPMA

Tightness

Polyutethane resin and housing in PPMA and polyacetol

Cell weight

60 g

Cell dimensions

30 x 32 mm

Protection

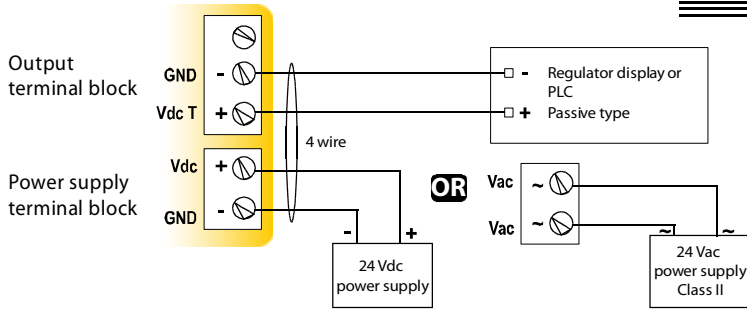
IP 66

ELECTRICAL CONNECTION

CR100-V

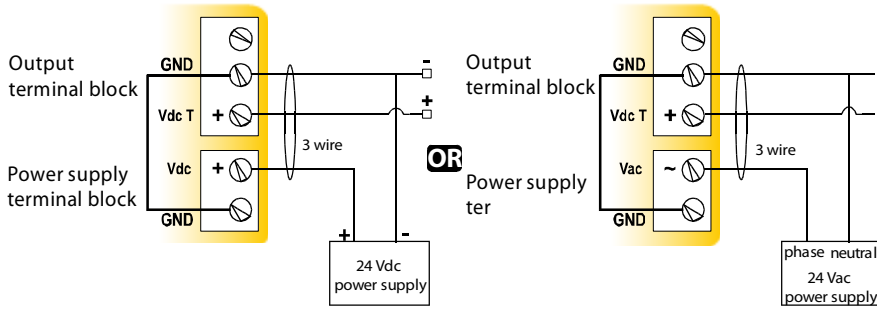
0-10V output - Active

4 wire



For a 3 wire connection, before power up, connect ground output with ground input. Eg: wiring diagram above.

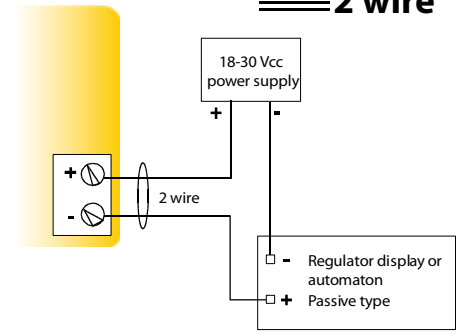
3 wire



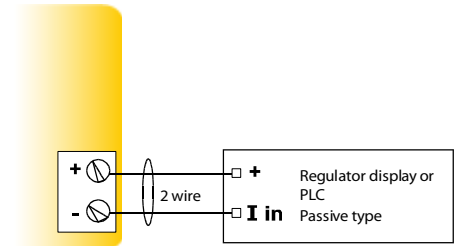
CR100-A

4-20 mA output - Passive

2 wire



OR



OPTIONAL



Angle mounting



Fixing kit for solar panels

Händlerkontakt:



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